Memorandum

The City of Traverse City Engineering Department



TO: Timothy J. Lodge, P.E., City Engineer

FROM: John Zarafonitis, Seasonal Engineering Intern

DATE: Friday, November 6, 2015

SUBJECT: 2 Day Speed Study of Railroad Ave. between Eighth St. and Webster St.

City Engineering performed an on-site 2 day speed count beginning Tuesday, November 3, 2015 at 5 pm until Friday, November 6, 2015 at 10 am on Railroad Ave. between Eighth St. and Webster St. This memo is to formalize City Engineering's initial findings and observations with regard to the speeds of vehicles on Railroad Ave.

The data was gathered using a Jamar Radar Recorder which collected traffic data, including vehicle speed, for each lane of traffic (eastbound and westbound). This information was then analyzed and the data for each lane compiled into one report, regardless of direction, using TraxPro. The TraxPro report organized the speeds of the vehicles into groups based on 5 mile per hour increments, starting with 0-15 miles per hour. The report shows how many vehicles were within the specified speed range during the time indicated by the report.

During the 2 day study, 4510 vehicles were recorded on this section of Railroad Ave. with about 70 percent of vehicles traveling between 21 and 30 miles per hour with an average speed of 24 miles per hour. The percentage of vehicles recorded at speeds over 25 miles per hour was 41.8 percent. Northwest bound and southeast bound vehicles had similar values for all of the above statistics except for the actual number of vehicles travelling in either direction. There were 2118 vehicles recorded going within the pace speed heading in the northwest bound direction, over double the 1044 recorded travelling southeast. The number of vehicles going over the posted speed limit had the same relationship, with 1279 headed northwest in comparison to the 604 going southeast.

Summary (Combined):

Speed Limit: 25 mph
Number of Recorded Vehicles (2 day): 4510
Average Speed: 24 mph
Total Percentage Above Speed Limit: 41.8 %

	Average Daily Traffic (#)	Percent Change (%)
2012 (July)*	1,798	0.66%
2015 (November)	1,810	

^{* =} This is from the section of Railroad between Washington St. and Webster St., because the most recent ADT between Webster St. and Eighth St. is from 2003 (1,704)

Encl.: Detailed TraxPro Speed Reports (Combined and Directional)